Operational Guide # ADM-008 June 1996 Credit: Mr. Harla D. Cox, HQ AFSPC/SVPM

7-STEP CONTINUOUS IMPROVEMENT PROCESS MODEL

<u>PURPOSE:</u> To provide management and staff a systematic approach to plan, sequence, implement, and track improvement efforts with the club.

SCOPE: This guide applies to all enlisted, officers, collocated and consolidated clubs worldwide. It can be used to solve problems, improve services, programs, and processes, either by teams and/or individuals.

GENERAL: The 7-Step Continuous Improvement Process (CIP) Model is the accepted Quality Air Force (QAF) problem solving /improvement process. This process collects data and stratifies it into manageable elements. Additionally, the CIP provides a common language and methodology and enables you to understand the improvement process.

GUIDANCE:

STEP 1: Identify Improvement opportunity. Establish a logical pattern or framework which will carry the team, work group, or individual through the improvement process. Develop indicators, such as graphs, flowcharts, or control charts to help visualize the need for improvement. Remember to narrow the focus to a specific process--don't aim for a large-scale success before first testing collective skills and abilities on a more manageable scale.

- OBJECTIVE: Select the appropriate process for improvement
 - -- Must address why the process was selected and how the improvement effort supports the club's plans, goals, and objectives
 - -- Research for improvement opportunities
 - -- Review metrics/indicators
- -- Survey internal/external customers
- -- Standard procedures
- -- Interview personnel
- CHECKPOINTS include:
 - -- Key processes identified

- -- Identify critical success factors identified
- -- Process to be improved identified
- -- Indicator established to measure process performance
- -- Schedule for completing CIP and leadership reviews identified

STEP 2: Evaluate Process Select an opportunity and set a target for improvement. Focus on close details, collect and interpret data relating to the process, and identify specific issues to tackle. The "problem" is any discrepancy between the current and desired state of a process.

- OBJECTIVE: Select a problem and set a target for improvement
 - -- Collect data on all aspects of improvement
 - -- Select tools to use (checksheet, flow chart, histogram, etc.)
- CHECKPOINTS include:
 - -- "As-is" flow chart developed
 - -- Problem stratified to a specific level for analysis
 - -- Most significant portion of the problem selected

STEP 3: Analyze. To uncover the root cause, explore the data using analytical tools. Using the appropriate tools can lead to the selection of one or more root causes.

- OBJECTIVE: To identify and verify the root cause(s) of the problem
 - -- Cause & Effect Diagram
 - -- Scatter Diagram
 - -- Pareto Chart
- CHECKPOINTS include:
 - -- Cause & effect analysis performed on the problem
 - -- Potential causes analyzed to actionable root causes
 - -- Root cause with greatest probable impact selected
 - -- Root causes verified using data

STEP 4: Take Action. Propose improvements by using an Action Plan Matrix, which identifies methods to use in attacking root causes. Evaluate the methods on the basis of effectiveness, feasibility, and cost benefits derived. Develop a plan to implement those improvements.

- OBJECTIVE: To plan and implement actions that correct causes -- Take Action Matrix -- Force Action Analysis -- Cost-Benefit Analysis - CHECKPOINTS include: -- Possible actions developed and evaluated -- Actions were cost beneficial -- Actions tested -- Approval obtained -- Action plan implemented STEP 5: Study Results. Learn if the actions taken allow achievement of desired objective/results. This confirmation step allows the understanding why the target for improvement was or wasn't met. If original actions weren't effective, then additional actions may be necessary. - OBJECTIVE: To confirm the action taken achieved the target -- Run Chart -- Control Chart -- Pareto Chart - CHECKPOINTS include: -- Indicator same one used in identifying the process -- Results of actions met or exceeded target -- Reasons why target was met or not met -- Additional actions taken STEP 6: Standardize Solution. Make improvements part of daily operations by integrating improvement efforts not the organization. Once established in the day-to-day working operations, try to extend this improvement into other areas.

- OBJECTIVE: To ensure the improvement level of performance is maintained

- -- Standardize Procedures
- -- Flow Chart
- CHECKPOINTS include:
 - -- Revised methods & procedures published
 - -- Training on new process achieved
 - -- Periodic process review points established
 - -- Areas for replication considered

STEP 7: Plan for Future. The improvement process allows the opportunity to review work accomplished, address remaining issues, and evaluate effectiveness. Lessons learned can be reviewed.

- OBJECTIVE: To plan what is to be done with any remaining problems and evaluate effectiveness
 - -- Action Plan
 - -- Brainstorming
- CHECKPOINTS include:
 - -- Remaining issues analyzed and evaluated
 - -- Future actions planned
 - -- Evaluate problem-solving skills and effectiveness

SUMMARY:

Using the systematic approach to problem-solving and/or improvement efforts allows consideration of all possible causes, concentration on only significant portions of the problem, selection of the solution that's most beneficial and cost-effective, and standardized implementation of the improvement and/or change. In the long run, it saves time while improving a process or solving a problem in order to increase value-added customer service and products.

<u>PURPOSE:</u> To provide management and staff a systematic data-based approach to plan, sequence, implement, and track improvement efforts with the club.

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<u>GENERAL</u>: The 7-Step Continuous Improvement Process (CIP) Model is the accepted Quality Air Force (QAF) problem solving /improvement process adopted Air Force-wide. This process collects data and stratifies it into manageable elements. Additionally, the CIP provides a common language and methodology and enables anyone in the Air Force to understand the improvement process.

GUIDANCE: Here's the 7 steps of the continuos improvement process:

STEP 1: *Identify Improvement opportunity.* Establish a logical pattern or framework which will carry the team, work group, or individual through the improvement process. Develop indicators, such as graphs, flowcharts, or control charts, to help visualize the need for improvement. Remember to narrow the focus to a specific process--don't aim for a large-scale success before first testing collective skills and abilities on a more manageable scale.

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- OBJECTIVE: To plan and implement actions that correct causes
 - -- Take Action Matrix
 - -- Force Action Analysis
 - -- Cost-Benefit Analysis
- CHECKPOINTS include:
 - -- Possible actions developed and evaluated
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 - -- Run Chart
 - -- Control Chart
 - -- Pareto Chart
- CHECKPOINTS include:
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